

## Department of Energy

## § 431.443

in the population is the ratio (expressed as a percentage) of the motor's useful power output to its total power input when the motor is operated at its full rated load, rated voltage, and rated frequency.

*Basic model* means, with respect to a small electric motor, all units of a given type of small electric motor (or class thereof) manufactured by a single manufacturer, and which have the same rating, have electrical characteristics that are essentially identical, and do not have any differing physical or functional characteristics that affect energy consumption or efficiency. For the purpose of this definition, "rating" means a combination of the small electric motor's group (i.e., capacitor-start, capacitor-run; capacitor-start, induction-run; or polyphase), horsepower rating (or standard kilowatt equivalent), and number of poles with respect to which § 431.446 prescribes nominal full load efficiency standards.

*CAN/CSA* means Canadian Standards Association.

*DOE* or *the Department* means the U.S. Department of Energy.

*EPCA* means the Energy Policy and Conservation Act, as amended, 42 U.S.C. 6291-6317.

*IEC* means International Electrotechnical Commission.

*IEEE* means Institute of Electrical and Electronics Engineers, Inc.

*NEMA* means National Electrical Manufacturers Association.

*Small electric motor* means a NEMA general purpose alternating current single-speed induction motor, built in a two-digit frame number series in accordance with NEMA Standards Publication MG1-1987, including IEC metric equivalent motors.

### TEST PROCEDURES

#### § 431.443 Materials incorporated by reference.

(a) *General*. The Department incorporates by reference the following standards into Subpart X of part 431. The Director of the Federal Register has approved the material listed in paragraph (b) of this section for incorporation by reference in accordance with 5 U.S.C. 552(a) and 1 CFR part 51.

Any subsequent amendment to a standard by the standard-setting organization will not affect the DOE test procedures unless and until the DOE amends its test procedures. DOE incorporates the material as it exists on the date of the approval and a notice of any change in the material will be published in the FEDERAL REGISTER. All approved material is available for inspection at the National Archives and Records Administration (NARA). For information on the availability of this material at NARA, call 202-741-6030, or go to: [http://www.archives.gov/federal\\_register/code\\_of\\_federal\\_regulations/ibr\\_locations.html](http://www.archives.gov/federal_register/code_of_federal_regulations/ibr_locations.html). Also, this material is available for inspection at U.S. Department of Energy, Office of Energy Efficiency and Renewable Energy, Building Technologies Program, Sixth Floor, 950 L'Enfant Plaza, SW., Washington, DC 20024, (202) 586-2945, or go to [http://www1.eere.energy.gov/buildings/appliance\\_standards/](http://www1.eere.energy.gov/buildings/appliance_standards/). Standards can be obtained from the sources below.

(b) *CAN/CSA*. Canadian Standards Association, Sales Department, 5060 Spectrum Way, Suite 100, Mississauga, Ontario, L4W 5N6, Canada, 1-800-463-6727, or go to <http://www.shopcsa.ca/onlinestore/welcome.asp>.

(1) CAN/CSA-C747-94 ("CAN/CSA-C747") (Reaffirmed 2005), *Energy Efficiency Test Methods for Single- and Three-Phase Small Motors*, IBR approved for § 431.444.

(2) [Reserved]

(c) *IEEE*. Institute of Electrical and Electronics Engineers, Inc., 445 Hoes Lane, P.O. Box 1331, Piscataway, NJ 08855-1331, 1-800-678-IEEE (4333), or go to <http://www.ieee.org/web/publications/home/index.html>.

(1) IEEE Std 112™-2004 (Revision of IEEE Std 112-1996) ("IEEE Std 112"), *IEEE Standard Test Procedure for Polyphase Induction Motors and Generators*, approved February 9, 2004, IBR approved for § 431.444.

(2) IEEE Std 114-2001™ (Revision of IEEE Std 114-1982) ("IEEE Std 114"), *IEEE Standard Test Procedure for Single-Phase Induction Motors*, approved December 6, 2001, IBR approved for § 431.444.